[4910-13-P]

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2014-0569; Directorate Identifier 2014-NM-047-AD; Amendment 39-18199; AD 2015-14-01]

RIN 2120-AA64

Airworthiness Directives; Bombardier, Inc. Airplanes

AGENCY: Federal Aviation Administration (FAA), Department of Transportation (DOT).

ACTION: Final rule.

SUMMARY: We are adopting a new airworthiness directive (AD) for certain Bombardier, Inc. Model DHC-8-400 series airplanes. This AD was prompted by a report of loose bolts that are intended to secure the translating door crank assembly to the outside handle shaft. This AD requires a detailed inspection for loose bolts on the aft translating door crank assembly, and removal and reinstallation of the bolts. We are issuing this AD to prevent loose bolts from falling out. If both bolts become loose or fall out after the door is closed and locked, the door cannot be opened from inside or outside, which could impede evacuation in the event of an emergency.

DATES: This AD becomes effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

The Director of the Federal Register approved the incorporation by reference of a certain publication listed in this AD as of [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES: You may examine the AD docket on the Internet at http://www.regulations.gov/#!docketDetail;D=FAA-2014-0569; or in person at the Docket Management Facility, U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE., Washington, DC.

For service information identified in this AD, contact Bombardier, Inc.,

Q-Series Technical Help Desk, 123 Garratt Boulevard, Toronto, Ontario

M3K 1Y5, Canada; telephone 416-375-4000; fax 416-375-4539; email

thd.qseries@aero.bombardier.com; Internet http://www.bombardier.com. You may view
this referenced service information at the FAA, Transport Airplane Directorate, 1601

Lind Avenue SW., Renton, WA. For information on the availability of this material at
the FAA, call 425 227-1221. It is also available on the Internet at

http://www.regulations.gov by searching for and locating Docket No. FAA-2014-0569.

FOR FURTHER INFORMATION CONTACT: Cesar Gomez, Aerospace Engineer,
Airframe and Mechanical Systems Branch, ANE-171, FAA, New York Aircraft
Certification Office, 1600 Stewart Avenue, Suite 410, Westbury, NY 11590; telephone
516-228-7318; fax 516-794-5531.

SUPPLEMENTARY INFORMATION:

Discussion

We issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to certain Bombardier, Inc. Model DHC-8-400 series airplanes. The NPRM published in the <u>Federal Register</u> on August 15, 2014 (79 FR 48105). The NPRM was prompted by a report of loose bolts that are intended to secure the translating door crank assembly to the outside handle shaft. The NPRM proposed to require a detailed inspection for loose bolts on the aft translating door crank assembly, and removal and reinstallation of the bolts. We are issuing this AD to prevent loose bolts from falling out. If both bolts become loose or fall out after the door is closed and locked, the door cannot be opened from inside or outside, which could impede evacuation in the event of an emergency.

Transport Canada Civil Aviation (TCCA), which is the aviation authority for Canada, has issued Canadian Airworthiness Directive CF-2014-08, dated February 10, 2014 (referred to after this as the Mandatory Continuing Airworthiness Information, or "the MCAI"), to correct an unsafe condition for the specified products. The MCAI states:

There was one in-service report where the bolts securing the translating door crank assembly to the outside handle shaft were found loose. It was also found on another translating door that sealant was missing on these bolts. If both bolts become loose or fall out after the door is closed and locked, the door cannot be opened from inside or outside.

The aft entry translating door and aft service translating door are classified as emergency exits. The inability to open an emergency exit could impede evacuation in the event of an emergency.

This [Canadian] AD mandates the inspection of the translating door crank assemblies for loose bolts, as well as appropriate rectification [removal and reinstallation of the bolts].

You may examine the MCAI in the AD docket on the Internet at http://www.regulations.gov/#!documentDetail;D=FAA-2014-0569-0002.

Comments

We gave the public the opportunity to participate in developing this AD. We have considered the comment received. The following presents the comment received on the NPRM (79 FR 48105, August 15, 2014), and the FAA's response to the comment.

Request to Remove Certain Requirements from the NPRM (79 FR 48105, August 15, 2014)

Horizon Air requested that the job set-up and close-out procedures included in Part A-INSPECTION, and Part B-RECTIFICATION, of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013, be removed as requirements in the NPRM (79 FR 48105, August 15, 2014). The commenter noted that only the procedures included in paragraph B. Procedure, of Part A and Part B of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013, provide corrective actions to address the unsafe condition. The commenter stated that the job set-up and close-out procedures do not directly correct the unsafe condition and restrict an operators' ability to perform maintenance in conjunction with the detailed inspection that would be required by the proposed AD.

We partially agree with the commenter's request. We agree to remove the job set-up procedures and most of the steps in the job close-out procedures from this AD because those actions do not directly correct the unsafe condition. We have revised paragraph (g) of this AD to specify that the inspection must be done in accordance with paragraph 3.B., "Procedure," of Part A – INSPECTION, of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013.

We have also revised paragraphs (g)(1) and (g)(2) of this AD to specify that the corrective actions must be done in accordance with paragraph 3.B., "Procedure," and steps 3.C.(4) and 3.C.(5) of paragraph 3.C., "Close Out," of Part B – RECTIFICATION, of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013. The intent of this final rule is to ensure that the aft entry translating door and aft service translating door are correctly installed. Therefore, we consider the operational tests in steps 3.C.(4) and 3.C.(5) of paragraph 3.C., "Close Out," of Part B – RECTIFICATION, of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013, to be required actions to ensure that these doors operate properly. If maintenance is done concurrently with the required detailed inspection, it should not affect an operator's ability to return the aircraft to service. If the required detailed inspection cannot be completed because the airplane is undergoing maintenance, then the actions required by this AD can be accomplished just prior to the airplane being returned to service. Concurrently performing maintenance and doing the actions required by this AD should not cause a delay in an airplane's return to service.

Conclusion

We reviewed the relevant data, considered the comment received, and determined that air safety and the public interest require adopting this AD as proposed except for minor editorial changes. We have determined that these minor changes:

- Are consistent with the intent that was proposed in the NPRM (79 FR 48105,
 August 15, 2014) for correcting the unsafe condition; and
- Do not add any additional burden upon the public than was already proposed in the NPRM (79 FR 48105, August 15, 2014).

Related Service Information under 1 CFR part 51

We reviewed Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013. This service information describes procedures for a detailed inspection for loose bolts on the aft translating door crank assembly, and removal and reinstallation of the bolts. This service information is reasonably available because the interested parties have access to it through their normal course of business or by the means identified in the ADDRESSES section of this AD.

Costs of Compliance

We estimate that this AD affects 82 airplanes of U.S. registry.

We also estimate that it will take about 7 work-hours per product to comply with the basic requirements of this AD. The average labor rate is \$85 per work-hour. Required parts will cost about \$0 per product. Based on these figures, we estimate the cost of this AD on U.S. operators to be \$48,790, or \$595 per product.

Authority for this Rulemaking

Title 49 of the United States Code specifies the FAA's authority to issue rules on aviation safety. Subtitle I, section 106, describes the authority of the FAA Administrator. "Subtitle VII: Aviation Programs," describes in more detail the scope of the Agency's authority.

We are issuing this rulemaking under the authority described in "Subtitle VII, Part A, Subpart III, Section 44701: General requirements." Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

Regulatory Findings

We determined that this AD will not have federalism implications under Executive Order 13132. This AD will not have a substantial direct effect on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that this AD:

- 1. Is not a "significant regulatory action" under Executive Order 12866;
- 2. Is not a "significant rule" under the DOT Regulatory Policies and Procedures (44 FR 11034, February 26, 1979);
 - 3. Will not affect intrastate aviation in Alaska; and

4. Will not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

Examining the AD Docket

You may examine the AD docket on the Internet at http://www.regulations.gov/#!docketDetail;D= FAA-2014-0569; or in person at the Docket Management Facility between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this AD, the regulatory evaluation, any comments received, and other information. The street address for the Docket Operations office (telephone 800-647-5527) is in the ADDRESSES section.

List of Subjects in 14 CFR Part 39

Air transportation, Aircraft, Aviation safety, Incorporation by reference, Safety.

Adoption of the Amendment

Accordingly, under the authority delegated to me by the Administrator, the FAA amends 14 CFR part 39 as follows:

PART 39 - AIRWORTHINESS DIRECTIVES

1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

§ 39.13 [Amended]

2. The FAA amends § 39.13 by adding the following new airworthiness directive (AD):

2015-14-01 Bombardier, Inc.: Amendment 39-18199. Docket No. FAA-2014-0569; Directorate Identifier 2014-NM-047-AD.

(a) Effective Date

This AD becomes effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

(b) Affected ADs

None.

(c) Applicability

This AD applies to Bombardier, Inc. Model DHC-8-400, -401, and -402 airplanes, certificated in any category, serial numbers 4001 through 4411 inclusive.

(d) Subject

Air Transport Association (ATA) of America Code 52, Doors.

(e) Reason

This AD was prompted by a report of loose bolts that are intended to secure the translating door crank assembly to the outside handle shaft. We are issuing this AD to prevent loose bolts from falling out. If both bolts become loose or fall out after the door is closed and locked, the door cannot be opened from inside or outside, which could impede evacuation in the event of an emergency.

(f) Compliance

Comply with this AD within the compliance times specified, unless already done.

(g) Inspection and Corrective Actions

Within 600 flight hours or 100 days, whichever occurs first after the effective date of this AD: Do a detailed inspection of the aft translating door crank assembly for loose bolts, in accordance with paragraph 3.B., "Procedure," of Part A – INSPECTION, of the

Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013. Doing the applicable actions specified in paragraph (g)(1) or (g)(2) of this AD terminates the requirements of this paragraph.

- (1) If any loose bolt is found: Before further flight, remove and reinstall the translating door crank assembly bolt, in accordance with paragraph 3.B., "Procedure," and steps 3.C.(4) and 3.C.(5) of paragraph 3.C., "Close Out," of Part B RECTIFICATION, of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013.
- (2) If no loose bolt is found: Within 6,000 flight hours or 36 months, whichever occurs first after the effective date of this AD, remove and reinstall the translating door crank assembly bolts, in accordance with paragraph 3.B., "Procedure," and steps 3.C.(4) and 3.C.(5) of paragraph 3.C., "Close Out," of Part B RECTIFICATION, of the Accomplishment Instructions of Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013.

(h) Credit for Previous Actions

This paragraph provides credit for actions required by paragraphs (g), (g)(1), and (g)(2) of this AD, if those actions were performed before the effective date of this AD using Bombardier Service Bulletin 84-52-75, dated July 27, 2012, which is not incorporated by reference in this AD.

(i) Other FAA AD Provisions

The following provisions also apply to this AD:

- (1) Alternative Methods of Compliance (AMOCs): The Manager, New York Aircraft Certification Office (ACO), ANE-170, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. In accordance with 14 CFR 39.19, send your request to your principal inspector or local Flight Standards District Office, as appropriate. If sending information directly to the ACO, send it to ATTN: Program Manager, Continuing Operational Safety, FAA, New York ACO, 1600 Stewart Avenue, Suite 410, Westbury, NY 11590; telephone 516-228-7300; fax 516-794-5531. Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspector, the manager of the local flight standards district office/certificate holding district office. The AMOC approval letter must specifically reference this AD.
- (2) Contacting the Manufacturer: For any requirement in this AD to obtain corrective actions from a manufacturer, the action must be accomplished using a method approved by the Manager, International Branch, ANM-116, Transport Airplane Directorate, FAA; or Transport Canada Civil Aviation (TCCA), or Bombardier, Inc.'s TCCA Design Approval Organization (DAO). If approved by the DAO, the approval must include the DAO-authorized signature.

(j) Related Information

(1) Refer to Mandatory Continuing Airworthiness Information (MCAI) Canadian Airworthiness Directive CF-2014-08, dated February 10, 2014. This MCAI may be found in the AD docket on the Internet at

http://www.regulations.gov/#!documentDetail;D=FAA-2014-0569-0002.

(2) Service information identified in this AD that is not incorporated by reference is available at the addresses specified in paragraphs (k)(3) and (k)(4) of this AD.

(k) Material Incorporated by Reference

- (1) The Director of the Federal Register approved the incorporation by reference (IBR) of the service information listed in this paragraph under 5 U.S.C. 552(a) and 1 CFR part 51.
- (2) You must use this service information as applicable to do the actions required by this AD, unless this AD specifies otherwise.
 - (i) Bombardier Service Bulletin 84-52-75, Revision A, dated July 11, 2013.
 - (ii) Reserved.
- (3) For service information identified in this AD, contact Bombardier, Inc., Q-Series Technical Help Desk, 123 Garratt Boulevard, Toronto, Ontario M3K 1Y5, Canada; telephone 416-375-4000; fax 416-375-4539; email thd.qseries@aero.bombardier.com; Internet http://www.bombardier.com.
- (4) You may view this service information at the FAA, Transport Airplane Directorate, 1601 Lind Avenue SW., Renton, WA. For information on the availability of this material at the FAA, call 425-227-1221.

(5) You may view this service information that is incorporated by reference at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or go to: http://www.archives.gov/federal-register/cfr/ibr-locations.html.

Jeffrey E. Duven, Manager, Transport Airplane Directorate, Aircraft Certification Service.

Issued in Renton, Washington, on June 25, 2015.

[FR Doc. 2015-16463 Filed: 7/6/2015 08:45 am; Publication Date: 7/7/2015]